

**CAREX WALTERIANA (CYPERACEAE) AND EUPHORBIA INUNDATA
(EUPHORBIACEAE) NEW TO MISSISSIPPI**

Edwin L. Bridges

The University of Texas Herbarium, Austin, Texas 78713 USA

ABSTRACT

Carex walteriana and *Euphorbia inundata* are reported for the first time in the published literature on the flora of Mississippi. Both are found in wetland savannas on the outer coastal terraces of Jackson County. These sites are the westernmost known for both species. Their habitats and range disjunctions are related to their rangewide distribution and ecology.

KEY WORDS: Mississippi, *Carex*, *Euphorbia*, floristics.

Norquist (1984) discovered two species that were apparently unreported for Mississippi while conducting field work for a comparative study of the soils and vegetation of savannas in the state. Although Ms. Norquist suggested in 1988 that the authors could report her records, we waited until we had independently, without knowing the previous specific locations, found these species in the state. The collection data are as follows:

Carex walteriana Bailey (Cyperaceae). UNITED STATES. Mississippi: Jackson Co.: low pond cypress drainage swale on S side of US 90 at crossing of Franklin Creek, 0.1 mi W of Alabama state line, and 1.4 mi NE of int. Franklin Creek Rd exit from I-10; NWQ, NWQ, NEQ, Sec. 5, T7S, R4W, Kreole 7.5' Quad., 30° 28' 20" N, 88° 24' 08" W, elev. 10 ft., 16 May 1989, Orzell & Bridges 10099 (MISSA,MO,NCU,TEX).

The canopy dominant of this *Carex walteriana* site is *Taxodium ascendens*, with *Acer rubrum*, *Magnolia virginiana* and *Nyssa sylvatica* var. *biflora*. *Carex walteriana* dominates the herb layer, with subdominants *Ludwigia sphaerocarpa* and *Smilax walteri*. Other herbaceous associates include *Eriocaulon decangulare*, *Ludwigia microcarpa*, *Osmunda regalis*, *Panicum hemitomon*, *Rhynchospora corniculata*, *Woodwardia areolata* and *W. virginica*.

Carex walteriana is a common species of wet pond cypress or swamp black gum ponds, depressions and swales, and the edges of evergreen shrub-tree bogs and swamps. It ranges on the Atlantic and East Gulf Coastal Plains from the panhandle of Florida north to Massachusetts. The nearest records

to Mississippi are in Geneva County, Alabama [Kral 38642; McDaniel 8918 (VDB)] and in Okaloosa and Santa Rosa counties, Florida (Wilhelm 1984). *Carex walteriana* appears to be quite rare west of the Apalachicola River, although it is fairly frequent west to southwestern Georgia and in Florida to the Apalachicola National Forest. The author has collected *C. walteriana* in habitats similar to the Mississippi site in Liberty and Wakulla counties, Florida but has not seen it in apparently suitable habitats farther west in the Florida panhandle and southern Alabama. The Mississippi site is at least 120 km west of the nearest isolated station and 330 km west of the more continuous range.

Euphorbia inundata Torr. ex Chapm. (Euphorbiaceae). UNITED STATES. Mississippi: Jackson Co.: wetland longleaf pine savanna on W side of Martin Bluff Rd, 0.1-0.2 mi S of I-10 bridge, ca 3 mi N of Gautier and 1.5 mi E of Gautier-Vancleve Rd int. with I-10; NEQ, NEQ, SEQ, Sec. 13 (or SE part Sec. 37), T7S, R7W, Gautier North 7.5' Quad., 30° 26' 07" N, 88° 37' 55" W, elev. 25 ft., 16 May 1989, Orzell & Bridges 10101 (MISSA, TEX); acid low pine woods, ca 3 mi E of Ocean Springs, coastal flatwoods, 29 Apr 1967, S.B. Jones 11879 (VDB).

Euphorbia inundata is found in open, generally treeless low swales within wetland longleaf pine savannas. Associated species include *Aletris lutea*, *Calopogon pallidus*, *Centella asiatica*, *Chaptalia tomentosa*, *Ctenium aromaticum*, *Dichromena latifolia*, *Drosera capillaris*, *D. tracyi*, *Eriocaulon compressum*, *E. decangulare*, *Helianthus heterophyllus*, *Hypericum myrtifolium*, *Lophiola aurea*, *Lycopodium alopecuroides*, *Rhexia alifanus*, *R. lutea*, *Rhynchospora baldwinii*, *R. oligantha*, *R. plumosa*, *Sarracenia alata*, *S. psittacina*, *Scleria baldwinii* and *Xyris baldwiniana*.

Euphorbia inundata is nearly restricted to Florida, where it occurs in the Jacksonville area, along the west coast of the peninsula and in the panhandle (Michael Huft, pers. comm.). It is perhaps most frequent in the Apalachicola lowlands from Wakulla to Bay counties, Florida. The nearest records to Mississippi are from Baldwin County, Alabama. The only other specimens of *E. inundata* outside of Florida are from Charlton and Ware counties, Georgia (Michael Huft, pers. comm.). It occurred with 10% frequency in sample plots on the Rains (Typic Paleaquults) soil series in Mississippi (Norquist 1984). Kral (1983) contrasts it with *E. telephoides* Chapm., a local Apalachicola endemic, and notes that *E. inundata* is usually found in moist to wet pine flatwoods savannas and borders of *Hypericum* dominated ponds. The author has noted *E. inundata* to be fairly frequent in wetland longleaf pine savannas in Liberty and Franklin counties, Florida; however, it is considered rare in the Pensacola region (Wilhelm 1984).

ACKNOWLEDGMENTS

Special thanks to Michael Huft of the Field Museum of Natural History for sharing his unpublished information on *Euphorbia inundata*. Thanks to reviewers Guy Nesom and Carol Todzia for helpful comments. Publication costs were provided by the Plant Resources Center of the University of Texas at Austin.

LITERATURE CITED

- Kral, R. 1983. A report on some rare, threatened, or endangered forest-related vascular plants of the South. USDA, Forest Service, Technical Publ. R8-TP2. 1305 pp.
- Norquist, S.C. 1984. A comparative study of the soils and vegetation of savannas in Mississippi. M.S. thesis, Mississippi State University, Mississippi State. 110 pp.
- Wilhelm, G.S. 1984. Vascular flora of the Pensacola Region. Ph.D. diss., Southern Illinois University. 213 pp + bibliography.